

# MATERNAL MENTAL HEALTH: CURRENT STATUS AND FUTURE DIRECTIONS

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# EDUCATION AND TRAINING

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- M.S. in Biostatistics – University of Pittsburgh
- PhD, Epidemiology – University of Pittsburgh
- Post Doc - Western Psychiatric Institute and Clinic of the University of Pittsburgh Medical Center (Reproductive Psychiatric Epidemiology)
- Associate Professor – Mercer University School of Medicine
- Research Program – Perinatal Mental Health, (focus on postpartum functioning)

# WHY AM I HERE TODAY?

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- Evaluation of Postpartum Maternal Functioning/Barkin Index of Maternal Functioning<sup>1</sup>
- Maternal Mental Health in the U.S. and Georgia

# FOCUS OF RESEARCH PROGRAM

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- Dissertation topic: Development of BIMF

*“the goal of medical care for most patients today  
is to obtain a more ‘effective life’ and to preserve functioning  
and well-being”<sup>2</sup>*

*~Ware, Kosinski & Keller (1996)*

# GUIDING PRINCIPLES FOR DEVELOPMENT

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- Patient-Centered Measure
- Applicable in various settings
- Concise wording
- Easy to administer
- Taps new mothers' experiences



# MILESTONES

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- 2010: Development paper published
- 2010-present
  - Being used (and validated) in clinical, academic, community-based and commercial settings.
- Translated into 20+ languages
- 2015-present: included as an outcomes measure in the clinical trials of Brexanalone (SAGE Therapeutics)

# UNIQUE FEATURES

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- Assesses functioning, not mood.
- Domains:
  - Social support
  - Management
  - Mother-child interaction
  - Infant care
  - Self-care
  - Adjustment
  - Psychological well-being

# TESTIMONIALS

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*“NO ONE HAS EVER ASKED ABOUT ME  
BEFORE”*

~ RESEARCH PARTICIPANT AFTER COMPLETING BIMF





# WHY ARE THESE TOOLS NECESSARY?

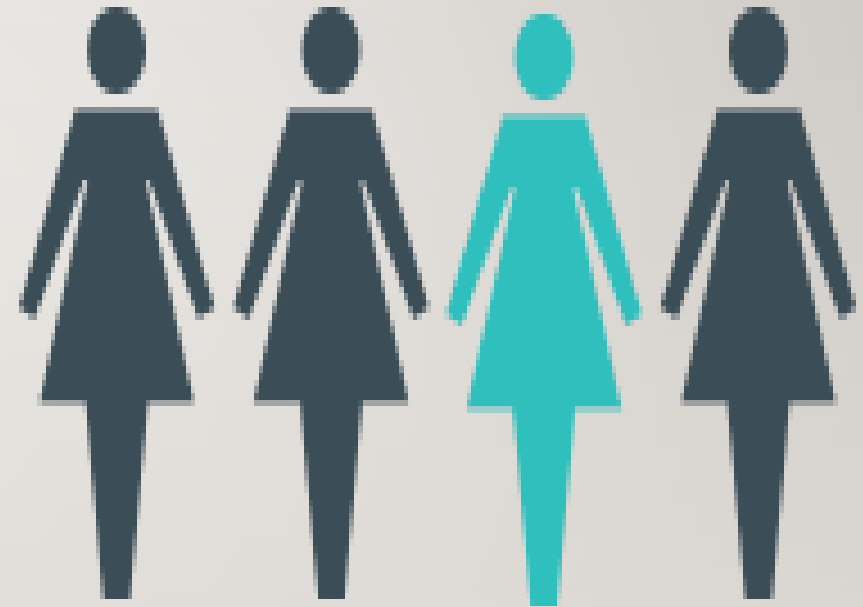
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- A number of maternal wellness tools available for pregnancy and postpartum
  - Perinatal depression
  - Perinatal Anxiety
  - Perinatal functioning, etc
- Perinatal Mood and Anxiety Disorders (PMADs) are the most common complication of childbearing<sup>3</sup>

# PREVALENCE

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- CDC estimates for PPD:
  - 1 in 5-9<sup>4</sup>
- Perinatal anxiety: 15.8-17.1%<sup>5</sup>
- Other disorders: OCD, PTSD, Postpartum Psychosis (less frequent)

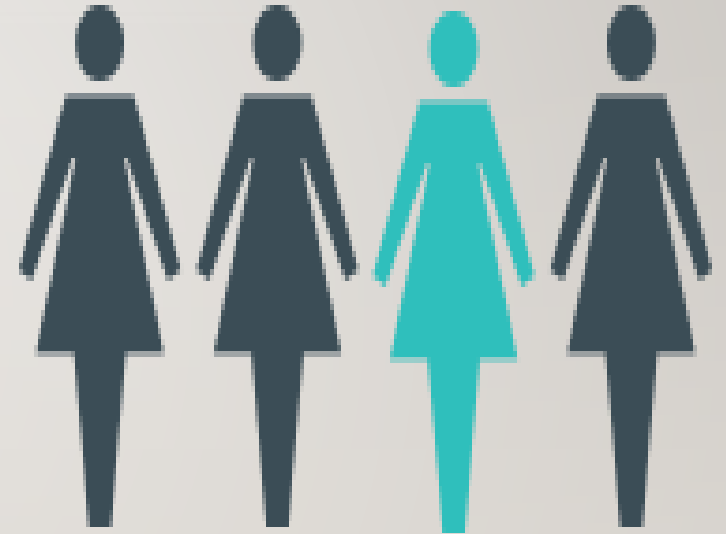


*Figure 1: Up to 25% of women may suffer from postpartum depression.*

# PMADS CONSEQUENCES, MOTHER

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- Physical health
- Health care practice and utilization
- Quality of life
- Relationships
- Sexual functioning
- Risky behaviors



*Figure 1: Up to 25% of women may suffer from postpartum depression.*

# PMADS CONSEQUENCES, FATHER

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- 24-50% of the time Dads are also depressed<sup>6</sup>
- Less likely to seek help
- Caregiver burden
- Marital difficulty
- Suboptimal bonding with child
- Overwhelmed, isolated, stigmatized, frustrated





# PMADS CONSEQUENCES, CHILD

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Infants of mothers with PPD:

- failure to thrive
- attachment disorders
- developmental delays
- behavioral issues

.....by age one.





# FETAL PROGRAMMING

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- Intrauterine environment impacts the developing fetus
- PMADs during pregnancy show a clear influence on child development<sup>8</sup>
- PMADs are an issue of family health



# PMADS CONSEQUENCES, COST

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- First ever study related to cost of PMADs
- Untreated PMADs are “Costly and have Multigenerational Consequences”
- Estimated cost of **14.2 Billion** for all births in 2017<sup>9</sup>

# WHAT IS BEING DONE?

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- Slow paradigm shift from model focused solely on clinical outcomes of the pregnancy to inclusion of mother's mental health.
- No U.S. federal policies, at least 12 states have taken *some degree of action* on maternal mental health.<sup>10</sup>

# RECOMMENDATIONS

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- **American College of Obstetricians and Gynecologists:** Full assessment of mood and emotional well-being (including screening for postpartum depression and anxiety with a validated instrument) during the postpartum visit.<sup>11</sup>
  - **American Academy of Pediatrics:** PPD screening at the 1-, 2-, 4-, and 6-month visits.<sup>12</sup>
  - **US Preventive Services Task Force, American Psychological Association agree**
  - “ Because fewer than 20 percent of women in whom perinatal depression is diagnosed self-report their symptoms, routine screening by physicians is important for ensuring appropriate follow-up and treatment.”

~Former ACOG President, Mark DeFrancesco



# ARE THE RECOMMENDATIONS ADHERED TO?

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”Screening rates for PPD are inconsistent and low among physicians. Physicians most often rely on clinical assessment to evaluate PPD but this method is often inaccurate or inconsistent in evaluating or diagnosing PPD.”<sup>13</sup>



# BARRIERS TO SCREENING

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- Lack of:
  - specific training on PMADs
  - established protocols for screen-positive women
  - mental health infrastructure in the area
  - understanding of how drugs impact the fetus, breastmilk
  - access to mother's medical records
  - confidence that the family will appreciate

# BARRIERS TO SCREENING

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- “I can see something is wrong, and I want to ask what’s going on...but I’m afraid she will tell me. Then what do I do with her?” (Peds Provider)
- “I see women with depression, but the only drug I’m comfortable with is Zoloft. I wasn’t trained for this – I was trained as a surgeon, but I really want to be able to help.” (OB/GYN provider)

# ACOG: FOURTH TRIMESTER<sup>14</sup>

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- “Postpartum care should become an ongoing process rather than a single encounter”
- Contact with all women within 3 weeks pp
- Ongoing follow-up as needed 3-12 weeks
- 4-12 weeks, comprehensive pp visit and transition to well-woman care
  - Full assessment of mood and mental health

# KEY AREAS TO ADDRESS

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- PMADs training for practicing clinicians who work with new moms.
  - Training modules already exist
  - Not cost prohibitive
- Embedded PMADs-focused curriculum at medical schools
  - For those going into peds, ob/gyn, family practice, psychiatry
- Increased screening rates across the state
  - Ideally for PPD/PPA and maternal functioning

# THE TOOLS ALREADY EXIST

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- ✓ Passionate providers who want to provide robust care to their patients.
- ✓ Validated screening tools: Edinburgh Postnatal Depression Scale, Barkin Index of Maternal Functioning
- ✓ Postpartum Support International, Georgia Chapter: Facilitates PMADs training and provides resources
- This win is within reach!



THANK YOU FOR YOUR TIME  
INVESTMENT

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# REFERENCES

1. Barkin, J. L., Wisner, K. L., Bromberger, J. T., Beach, S. R., Terry, M. A., & Wisniewski, S. R. (2010). Development of the Barkin index of maternal functioning. *Journal of Women's Health*, 19(12), 2239-2246.
2. Ware Jr, J. E., Kosinski, M., & Keller, S. D. (1996). A 12-Item Short-Form Health Survey: construction of scales and preliminary tests of reliability and validity. *Medical care*, 220-233.
3. [http://www.nationalperinatal.org/resources/Documents/Position%20Papers/2018%20Position%20Statement%20PMADs\\_NPA.pdf](http://www.nationalperinatal.org/resources/Documents/Position%20Papers/2018%20Position%20Statement%20PMADs_NPA.pdf)
4. <https://www.cdc.gov/reproductivehealth/depression/index.htm#Postpartum>
5. Fairbrother, N., Janssen, P., Antony, M., Tucker, E. & Young, A. (2016). Perinatal anxiety disorder prevalence and incidence. *J Affect Disord*, 200(8), 148 – 155.
6. Goodman, J. H. (2004b). Paternal postpartum depression, its relationship to maternal postpartum depression, and implications for family health. *Journal of Advanced Nursing*, 45(1), 26–35.
7. Earls, M. F. (2010). Incorporating Recognition and Management of Perinatal and Postpartum Depression Into Pediatric Practice. *Pediatrics*, 126(5), 1032-1039. doi:10.1542/peds.2010-2348

# REFERENCES

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8. Robinson, R., Lahti-Pulkkinen, M., Heinonen, K., Reynolds, R. M., & Räikkönen, K. (2019). Fetal programming of neuropsychiatric disorders by maternal pregnancy depression: a systematic mini review. *Pediatric research*, 85(2), 134-145.
9. <https://www.mathematica-mpr.com/news/new-study-uncovers-the-heavy-financial-toll-of-untreated-maternal-mental-health-conditions?fbclid=IwARlDPE9VjtADf6MIBcDYmHCseEgkJ0oZsWgqMjgssKfTLvXTvr7PsXJxQdk>
10. <https://www.postpartum.net/professionals/legislation/>
11. <https://www.acog.org/Clinical-Guidance-and-Publications/Committee-Opinions/Committee-on-Obstetric-Practice/Screening-for-Perinatal-Depression>
12. <https://www.aap.org/en-us/advocacy-and-policy/aap-health-initiatives/Screening/Pages/Screening-Recommendations.aspx>
13. Long, M. M., Morgan, F. G., Wilkes, C.A., Fontanares, A. J., MacFarlane, B., & Cramer, R. J. (2018). Screening Rates, Elevated Risk, and Correlates of Postpartum Depression in an Obstetric Population [280]. *Obstetrics & Gynecology*, 131, 170S.
14. <https://www.acog.org/-/media/Committee-Opinions/Committee-on-Obstetric-Practice/co736.pdf?dmc=1&ts=20190222T1814547421>